

## **REMARKS**

As a preliminary matter, the Examiner incorrectly asserts that Applicant's Election (Response filed November 29, 2004) was made without traverse. In fact, Applicant did specifically traverse the Examiner's Restriction Requirement, and on the grounds that an examination of two additional claims out of 14 would not place an burden on the Examiner.

The Examiner's additional assertion, that "Applicant did not distinctly and specifically point out the supposed errors in the Restriction Requirement" is therefore also erroneous. The Examiner's failure to establish that the examination of 14 claims instead of 12 would place an undo burden upon the Examiner is an error, and also a valid ground for traversing a Restriction Requirement. It is not enough for the Examiner to merely assert that *some* additional burden will exist from examining the two additional claims. The Examiner must actually establish that the examination of these two additional claims places an undue, or serious, burden upon the Examiner. The Examiner has not met this burden, nor has the Examiner attempted to answer Applicant's meritorious arguments that the examination of claims 7 and 8, in addition to the other twelve claims of the Application, will place an undue burden on the Examiner.

As a second preliminary matter, the Title of the Invention has been amended as requested by the Examiner. Entry of the new Title is respectfully requested.

Claims 1-5 stand rejected under 35 U.S.C. 102(b) as being anticipated by Higashiya et al. (JP 06-012807). Applicant respectfully traverses this rejection as follows.

With respect to independent claim 1 of the present invention, Applicant traverses the rejection because the cited reference does not disclose (or suggest) a head slider that has a cavity on the air outlet end of the slider, as in claim 1 of the present invention. Higashiya teaches a head slider 10 that has a plurality of circular minute recessed parts 1 located across the air bearing surfaces of the dual rails 11. (See Fig. 1). Higashiya clearly shows that these recessed parts 1 are located only on the air bearing surfaces of the rails 11, and not on the slider rail runoff edge 13 (the air outlet end) of the slider. Applicant respectfully points out to the Examiner that claim 1 of the present invention does not recite that the cavity is *near* the air outlet end, but is actually on the air outlet end of the present head slider. Higashiya fails to teach (or suggest) such features, and therefore the rejection of claim 1 is respectfully traversed for at least these reasons.

Nevertheless, although Applicant submits that no such amendment is necessary based on the comments above, in the interests of expediting prosecution, Applicant has amended claim 1 herein to further clarify that the cavity is located on the air outlet end between the transducer and a rearmost portion of the head slider. Applicant submits that one skilled in the art would have already understood this configuration when reading original claim 1 in light of the Specification to the present Application. Nevertheless, this clarification to claim 1 will exclude even the Examiner's overly broad interpretation, and therefore Applicant further traverses the rejection for at least these reasons as well.

With respect to claims 2 and 3 of the present invention specifically, Applicant traverses the rejection because Higashiya's circular recessed parts 1 cannot meet the recited limitations of either of claims 2 or 3 of the present invention. Claims 2 and 3 of the present invention both feature that the depth ( $z$ ) of the cavity is a function of both  $x$  and  $y$ . Higashiya, on the other hand, shows that the  $z$ -direction depth of the circular recessed parts 1 is consistently flat, and thus unrelated to any functions in the  $x$ - and  $y$ -directions of the recessed parts. Furthermore, the Examiner has demonstrated no mathematical proof for how the circle-only shape to Higashiya's parts 1 could result from the specific formulas for  $f(x)$  and  $g(y)$  featured in claim 2. (See page 18 of the present Specification, for example). Accordingly, because the Examiner has cited to no teaching (or suggestion) from Higashiya that would indicate that its circular recessed parts 1 could have a shape to satisfy the  $x$ - and  $y$ -functions of the present invention, or that its depth is dependent on the  $x$ - and  $y$ - functions, the Section 102 rejection of claims 2 and 3 based on Higashiya is also respectfully traversed for at least these reasons.

With respect to claim 3 of the present invention in particular, Applicant further traverses the rejection because Higashiya fails to teach (or suggest) that a shape to its circular recessed parts 1 is a sine function in either the  $x$ - or  $y$ - direction. Anyone skilled in the art should easily know that circles or semicircles do not represent sine functions. Accordingly, for at least these reasons as well, the rejection of claims 3 is further traversed.

With respect to claims 4 and 5 of the present invention, Applicant traverses this rejection because Higashiya does not teach (or suggest) that the interior space defined by its circular recessed parts 1 corresponds in any way to the portion of the head slider that projects (claim 4) or floats less than the transducer (claim 5) when a voltage is applied to the transducer. In fact, Higashiya does not teach (or suggest) any relationship between the shape of the recessed parts 1 and a voltage through a transducer. Both claims 4 and 5 of the present invention, on the other hand, define a clear relationship between the size of material to fill the cavity and the structural effect on the head slider from a voltage through the transducer.

Applicant submits that the Examiner is incorrect to afford little patentable weight to claims 4 and 5 of the present invention as being “product-by-process” claims. Section 2113 of the MPEP clarifies that even functional language in a claim can still define structural limitations, and the Examiner is required to give full consideration to any such distinctive structural characteristics. In the present case, the Examiner appears to have not given full consideration to the structural characteristics defined by claims 4 and 5 of the present invention. Accordingly, Applicant traverses the rejection for at least these reasons.

In the interests of expediting prosecution only, Applicant has amended claims 4 and 5 herein to recite the same structure already defined by the claims, but without the additional functional language that appears to have confused the Examiner. Applicant submits that this amendment to claims 4 and 5 represents grammatical changes only,

introduces no new limitations or subject matter, and therefore does not narrow the scope of either claim.

Claims 6 and 9-14 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Koishi (U.S. 6,501,622) in view of Higashiya. Applicant respectfully traverses this rejection because the Examiner has not established a *prima facie* case of obviousness against the present invention under. the Koishi reference is not prior art against the present Application under Section 103.

35 U.S.C. 103(c) excludes from Section 103 rejections “subject matter developed by another person, which qualifies as prior art only under one or more of subsections (e), (f), and (g) of Section 102...where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person.” In the present case, the Koishi patent would only qualify as prior art against the present Application under Section 102(e), and the assignment records indicate that both the Koishi patent and the present Application were subject to an obligation of assignment to the same “Fujitsu Limited” at the time of invention. Accordingly, the Koishi patent cannot be the basis of an obviousness rejection against the present Application under Section 103, and therefore the rejection of claims 6 and 9-14 must be withdrawn.

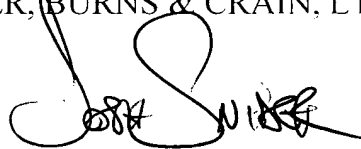
For all of the foregoing reasons, Applicant submits that this Application, including claims 1-14, is in condition for allowance, which is respectfully requested. The Examiner is invited to contact the undersigned attorney if a further interview would expedite prosecution.

Respectfully submitted,

GREER, BURNS & CRAIN, LTD.

**Customer No. 24978**

By

A handwritten signature in black ink, appearing to read "Josh C. Snider", is written over the printed name.

Josh C. Snider

Registration No. 47,954

August 23, 2005

300 South Wacker Drive  
Suite 2500  
Chicago, Illinois 60606  
Telephone: (312) 360-0080  
Facsimile: (312) 360-9315  
P:\DOCS\3531\68507\9C6972.DOC